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The Cornell Countryman

Vol. XLV, Jan. 1948, No. 4

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Leap Year's Here!

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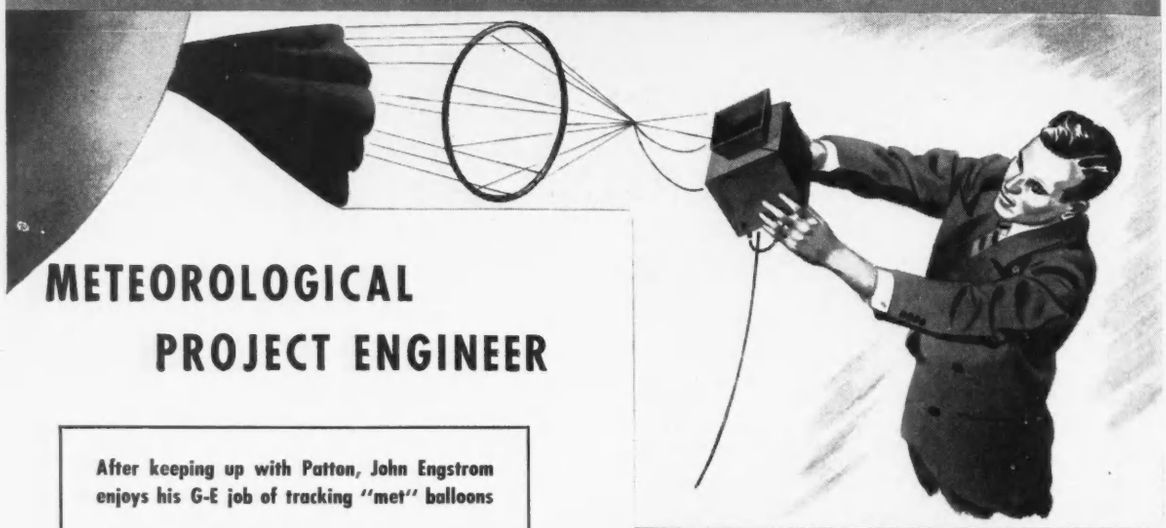
Campus to GENERAL ELECTRIC



METEOROLOGICAL PROJECT ENGINEER

After keeping up with Patton, John Engstrom enjoys his G-E job of tracking "met" balloons

In February, 1946, after he had happily allowed himself to become "inactive" in the files of the Reserve Army Signal Corps, John Engstrom—a family man with two kids—went looking for his first career-size job.

He was able to rely on the help of an old friend—his knowledge of electronics.

Ever since he started tinkering with radio sets in his teens, John had been doing things in electronics—and electronics had been doing things for him.

At the University of Minnesota he had earned part of his expenses by servicing radios between hours of studying for a degree in electrical engineering.

Going directly into the Army after his graduation in 1942, John had received further training in electronics at Fort Monmouth, New Jersey, and had been sent on a seven-month electronics assignment to South America. Later he had been assigned to a Signal Corps communication team and had helped provide General George Patton's headquarters with communication during the final victorious drive into Germany. And after V-E Day he had been flown back to the States to head up an investigation team to study the propagation of microwaves in low level ducts over tropical waters.

John Engstrom found his career-size job at General Electric. Reporting to Electronics Park in Syracuse, N. Y., he spent a year in developmental engineering. Today, as project engineer for the Army-Navy Meteorological Program, he is in charge of developing meteorological tracking and measuring equipment—a solid foothold in an electronics future.

For your copy of "Careers in the Electrical Industry," write to Dept. 237-6, General Electric Company, Schenectady, N. Y

John Engstrom admits that his attention perks up when he begins to think about electronics. He paid part of his college expenses at Minnesota servicing radios.

In the Army Signal Corps, he continued his work in electronics. His radio communications team helped keep channels open to Patton during the drive into Germany.

GENERAL ELECTRIC

CHAMPION FARMER BUERMAN uses Firestone Champion Ground Grips on his tractors, because he knows they clean up to 100% more effectively, pull up to 62% more, last up to 91% longer, and roll smoother over highways.

This superiority is based on patent rights which permit only Firestone to build tractor tires with connected curved traction bars. Curved bars are stronger . . . like a curved roof. They're braced . . . like a corner fence post. They cut into the soil with the cleaving, cleaning action of a plowshare. The tapered openings between the bars throw out mud and trash. Connected bars don't bend, wipe and wear like the bars on broken center tires. And because the bars are connected, the tire rolls along in smooth, continuous contact with the highway.

Be sure to specify Firestone Champion Ground Grips when you order your new tractor . . . or when you buy replacement tires for your present equipment. They'll *pull* more . . . *last* longer . . . and they'll *cost* no more than ordinary tires.

Listen to the Voice of Firestone every Monday evening over NBC

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Champion Farmer

MORRIS BUERMAN Uses

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CHAMPION GROUND GRIPS

Because they

OUTCLEAN
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ANY OTHER TRACTOR TIRE

FIFTY TONS OF CHERRIES! That is the average annual harvest of Champion Farmer Morris Buerman, Sodus, New York. His apple trees annually bear 12,000 bushels, and his peach trees, 1200 bushels. As "The Voice of Cherry Growers" on a series of radio broadcasts, Champion Farmer Buerman contributed much to increase the market demand for cherries, and to encourage growers to improve production methods and produce better quality fruit. The National Cherry Growers Association is an outgrowth of his local association in which he has been extremely active. As a leader in production, as well as in marketing methods, Champion Farmer Buerman naturally prefers Firestone Tires for his equipment.

Only FIRESTONE CHAMPION GROUND GRIPS TAKE A "CENTER BITE"

THERE'S A FIRESTONE TIRE FOR EVERY WHEEL THAT ROLLS ON YOUR FARM

DELUXE CHAMPION PASSENGER TRANSPORT TRUCK

The League Looks Forward

DAIRY FARMING—like any business—cannot remain at a standstill. Dairymen must progress . . . develop new markets and products . . . consolidate past gains. Their future and their family's future is largely dependent upon their ability to cope with tomorrow's problems.

More than 27,000 dairy farmers in the Northeast today look to their League for future guidance in marketing their number 1 crop—milk.

They know, too, that their continued prosperity rests upon close cooperation with all farm families in the Northeast . . . . upon the better understanding of their problems by consumers and business men . . . and upon the careful training of rural youth in the business of dairying.

Here are the aims of more than 27,000 Dairymen's League members, as concretely expressed by their farmer owned-and-controlled cooperative:

1 To continue to work toward maintaining milk prices in the entire milkshed at a level sufficient to cover farmers' costs of production and give them a reasonable profit.

2 To develop new products and new markets and thus provide greater security for dairy farmers.

3 To develop additional marketing facilities toward the end that milk producers are assured of their fair share of the consumers' dollar.

4 To bring about a better understanding of farmers' problems by the consumers who buy their products, and by business men whose interests are closely related to agriculture.

5 To bring about closer cooperation among the farm families in the New York Milkshed, so that through unity they can more successfully meet their marketing problems.

6 To give more emphasis to the League as a democratic family organization, and give young rural people, through the Young Cooperators organization, training in cooperative activities, leadership and a better understanding of marketing problems.

The Dairymen's League Cooperative—through its 27,000 members—aims to promote a more prosperous and stable agriculture . . . one which will benefit the entire economy of the rural Northeast.

DAIRYMEN'S LEAGUE CO-OPERATIVE ASSOCIATION

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The Cornell Countryman

Founded 1903 Incorporated 1940

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Up to Us...

CONGRATULATIONS to the 12 students (nine from ag and three from home ec) who have successfully completed the competition and been elected to the staff of the COUNTRYMAN.

The new members of the editorial board are: Pete Coates '50; Ruth Dymes '50; Eleanor Marchigiani '50; Wilbur Pope, two year; and Don Richter '50.

Our photography board now includes: Sumner Griffin '50; Frank Simpson '51; and Ronald Ward '51.

The business board's recent additions are: Lee Argana '50; Edna Gillette '50; Douglas Lockwood '50; and Brian Nevin '50.

BUT WHERE DO WE GO in 1948?

The effort to improve our publication has been constant. We have good resources: an experienced staff regularly augmented by students who wish to gain experience; an interested and informed board of directors; an extension teaching staff willing to help; an abundance of potential material for articles; and a well-equipped office.

With these as a foundation, we—the staff and the student body—can have an even better magazine, if *all* of us contribute material and ideas freely.

It's up to us, the staff, to publish the magazine—but it's *up to us,* the whole student body, to make THE CORNELL COUNTRYMAN a truly representative official student publication.

This is leap year, or so our calendar tells us. Getting a fine jump on the rest of the female population, Alice Tarbell tries her hand

at hooking some lucky man. Because she's a home ec, and a Cornell co-ed to boot, we think her chances are pretty good. Bob Clauson, our photography editor, took this candid shot just as the new year rolled in.

They Serve Agriculture

A County Agricultural Agent (left) visits one of "his" farmers.

NO group has worked harder and received less credit generally than our county agricultural agents. No group has done a better job and been less publicized. Their job is to help farmers to find better ways of doing their work and improving their living situation. These agents live in the counties and spend their entire time working with problems related to agriculture and community life. They work through committees and groups of leading citizens who determine the problems to be worked upon and, with the help of the agents, reach their own solution.

In their work the county agricultural agents in New York State are drawing upon the information available from a corps of subject-matter specialists located at the College of Agriculture at Cornell University. These specialists are close in touch with the research work being done by the Agricultural Experiment Stations at Ithaca and Geneva and the U. S. Department of Agriculture. Thus the agents act as the interpreters of agricultural problems to the college and in turn relay the findings of research to the people of the State.

New York State College of Agriculture
Cornell University

Bugless Beauties

by Warren Wigsten '50

To attract attention, an insect must be destructive. A tiny Red Spider mite, while eating his breakfast of sap from the rose leaf, unintentionally destroys the beautiful flower. For this he does indeed attract attention, and before man gets through with him, sincerely wishes he had chosen to feed on Goldenrod.

Billion Dollar Industry

Flower growing in New York State is a billion dollar industry. One grower alone spent a half million dollars to install equipment for his tremendous enterprise. The damage done by such insect pests as the Red Spider mite on roses is of real concern to rose growers. These mites multiply rapidly and require only about a week to grow from the egg stage to adulthood. When grown, they puncture the under side of the leaf and suck the sap from the plant. Through these punctures the insects pass off injurious toxins which cause the leaves to yellow, curl up, and die. They also spin extensive webs and can literally cover the buds and leaves in a short time.

A very unusual pattern of reproduction may be shown by the Red Spider mite. If the female is not fertilized, all her eggs will hatch to be males. These males will then fertilize her and the next generation will be mixed male and female. Thus these latter have a father but no grandfather, and the same female for both mother and grandmother.

Work on Control

Julius Hoffman, a graduate student in Entomology at Cornell University, experimented this summer under the direction of Extension Entomologist Prof. William E. Blauvelt on new control methods. Mr. Hoffman and John Naegele, a junior in Entomology at Cornell, worked with growers in Elmira, Utica, and Newark, New York, treating ranges with three new insecticides and comparing results. They also grew cultures of mites on rose plants in the Cornell insectary. Working in the fumigation chamber wearing protective clothing and gas masks, they tried out various dilutions of the insecticides to find out what proportions would give top results without damaging the roses.

Latest Insecticides

A new fumigant type, to be known as Thiophos 3422, proved to be the most effective, and Mr. Hoffman believes it is the best insecticide so far developed for the control of the Red Spider mite. It is applied as an aerosol. The powder is mixed with a compound which is liquid under pressure but which vaporizes when released from the container. The mist put out in this way is much finer than spray and can be applied much more rapidly. While it takes eight hours to spray a green house with ordinary spray, the job can be done in ten minutes with 3422. The 3422 destroys the mites within 24 hours and will also kill many of the egg stages. It has no harmful effects on roses and will not bleach the buds or curl the leaves.

Mr. Hoffman is studying on a Fellowship awarded by "Roses Incorporated," an organization for the advancement of the rose industry. He is continuing the work on Red Spider mite control and is interested now in finding out how long the fumigant will last after application, and whether or not it can be used on food plants such as fruit.

Warren Wigsten '50 is an an hus major from Poughkeepsie, N. Y., who has been a steady contributor to the COUNTRYMAN.

John Naegele '49 applying Thiophos 3422 by means of liquified gas aerosol bomb for control of spider mite on roses in floriculture greenhouses at Cornell.

A Look at Farm Power . . .

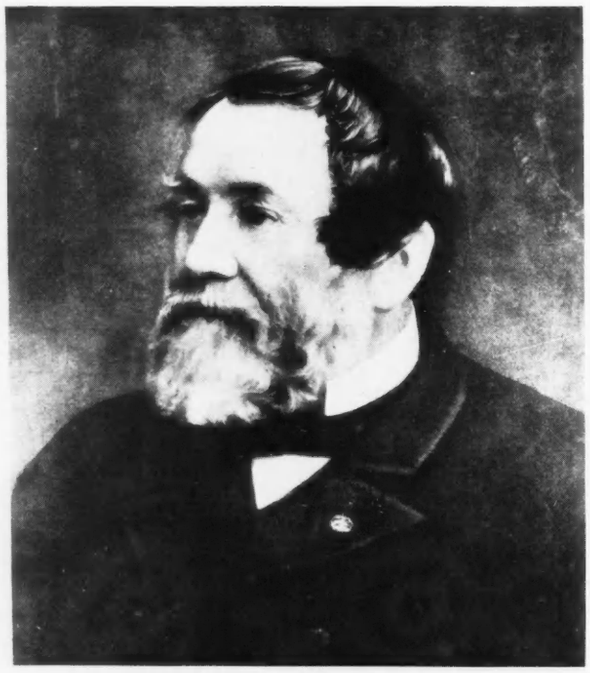
Today, as one drives through the extensive farmlands of America, the most striking characteristic of our modern agriculture is its relatively extreme mechanization. I say relatively because a few years hence we may look back on the decade 1940-1950 as only the beginning of modern farm use of power.

Early Progress

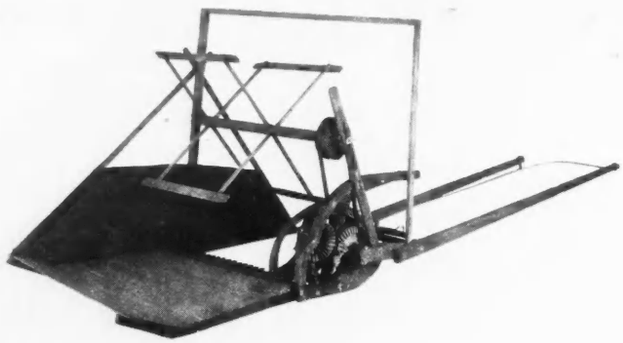
For many thousands of years prior to the 1800s there was little progress in farm machinery. The only significant advancements were the cradle and the moldboard plow. Animals and humans furnished the only form of farm power known.

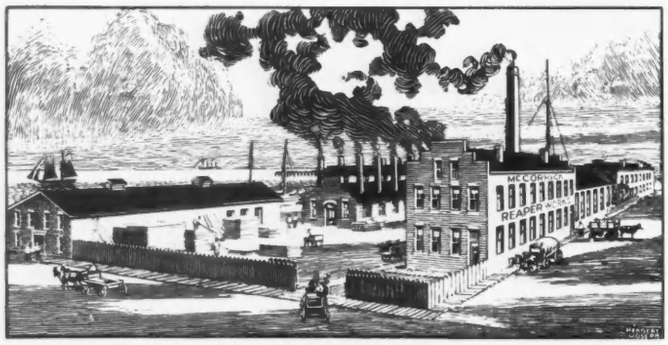
The turning point came, however, a little over one hundred years ago when, on a hot day in July, 1831, Cyrus Hall McCormick demonstrated his first successful reaper. Production of this early model assumed significant proportions in 1847 when thirty-three workers in the first McCormick factory turned out 500 reapers for the 1848 harvest. In 1902, after the great harvester wars, McCormick's heirs joined Deering and four other competitors to form the International Harvester Company, which now leads the world in the manufacture of farm machinery.

During this 19th century, as farming became a business in its own right, the simpler farm machines, such as plows and harrows,



Cyrus Hall McCormick





McCormick Works, Chicago, 1847
Looking South towards the Chicago River

Cyrus Hall McCormick (*top*) invented the first reaper (*above*) 100 years ago. It was first manufactured in Chicago (*left*). The modern combine (*right*), which is so indispensable in harvesting the world's grain crop, was developed from this humble origin.

. . . It's Come a Long Way

by Don Richter '50

were improved in design. The western expansion brought larger sizes of existing implements and there was steady improvement in the component materials, wood giving way to iron and later to steel. There was during this period, however, no progress in the basic power by which a farmer was able to do his work. A man's livelihood depended on his own muscles and those of his work animals.

The Mechanical Era

The invention of the steam engine brought to the American farmer the first of many complex machines. A farmer need not be very old to remember the coal-burning, water-devouring steam tractors that lumbered from farm to farm during the threshing season.

The life of this source of power was cut short, however, by the advent of the gas engine, which now provides the major part of our tractive and stationary farm power. In the wake of the first practical gasoline tractors came a steady improvement in the old farm implements and the introduction of several new ones. Steel gang plows now broke the prairie sod and a whole new array of machines designed for tractor power came into use.

In recent years the trend has been to mount implements on the tractor itself where they can be easily controlled by hydraulic power generated by the tractor. There is also another tendency to combine several operations into one, as exemplified by the various grain, corn, potato, and root-crop harvesters.

Electrons at Work

No discussion of farm machinery would be complete without mention of that up-and-coming youngster, electricity. Besides furnishing our light and heat, it is being put to work in eliminating many time-consuming chores on the farm. The gutter cleaner and silo unloader are but the latest of the many uses of electricity, which already milks our cows, cools our milk, and elevates our hay and grain.

Looking Ahead

To many of us, such advancement is but a prelude to what is yet to come. If the present trend of a lower farm population continues, there will of necessity be rapid progress in our farm machinery, for we must feed an ever-growing population and an ever-larger industry in addition to certain portions of the rest of the world.

Don Richter '50 is an ag engineering major who has recently joined the staff of the COUNTRYMAN.

A symbol of progress: from the caveman's bare hands to the modern combine.

Ag-tivities

Ag-Domecon

Refreshments! Ask any Ag-Domecon Council member what went on at the last meeting, and even though there was a long business meeting, he'll tell you about the surprise Christmas party the executive committee gave for the members.

After he's told you about that, he'll mention the round and square dance the Council is sponsoring at the Straight February 21. Milly Bentley is in charge, with Ginny Elliot '49, Mary Farrell '50, Don House '51, and Doug Sergeant '49, assisting.

Pomology

A committee under the direction of Richard Lyman is preparing two exhibits for the New York State Horticultural Society, to be used at Rochester and Kingston in the latter part of January. One will show purification of air in apple storage by the activated charcoal method. The other will demonstrate chemical thinning of apple flowers.

About Students

Pat King, Spec., was high man in the Senior division of the Student Dairy Judging contest Dec. 13.

Donald Holmes '48, and Gloria Wilkes, Spec., were married at Sage Chapel December 18.

Ilene Smith, '48, had a poem entitled *Skiing* accepted for publication in the contest for collegiate poets sponsored by the National Association of Poetry.

Harry Underwood '51, was high man in the Junior Division of the Student Dairy Judging Contest December 13.

Maurice F. Switzer '47, recently married Phyllis Murphy of Ithaca. Maurice, who majored in floriculture, is working with Jackson and Perkins of Newark, New York, in the production of new varieties of perennials.

We appreciate your response to our new personal column. Please send any items you know of to Ag-tivities Editor, % CORNELL COUNTRYMAN, Roberts Hall, Ithaca, New York, or notify any staff member. —Ed.

(*Please turn to page* 15)

Introducing . . .

Clauson '50

Helen Corbett

Helen started her career at the University of Minnesota, leaving her home town of Minneapolis to delve into the world's knowledge of diatetics. After her first year she determined to follow in the footsteps of her parents and grandfather and attend Cornell.

Helen states that Cornell seems to have a livelier spirit, a better-balanced social life, and a superior system of dormitories, but adds that there are too many required courses.

Her ability and pleasing manner have made Helen a well-known personality on campus. In her sophomore year she was on the Straight Browsing Library Committee, and now includes Arete, Pan-Hellenic Council, and Omicron Nu in her activities. As vice-president of WSGA, she handles the coordination of activities of sorority and independent women.

A member of Sigma Kappa, Helen is now realizing her desire for a knowledge of diatetics and is enthused about a position as a dietician in the commercial field following graduation. In this field her skill and finesse are certainly applied quite differently, and perhaps more constructively, than the skill of her cousin, "Gentleman Jim" Corbett, one-time boxing champ. —D.R.

The first bull over a ton to take to the air was Argilla Bell Boy, an 8-year-old Guernsey sire, who was recently shipped by plane from Oklahoma to New York.

Clauson '50

Ernest Schaufler

Ernie "Dan'l Boone" Schaufler won't explore the wilds of Kentucky and shoot "bars", but he'll be just as much a pioneer as the famous sharpshooter. A senior in Ag, Ernie plans to go into extension work in floriculture, one of the newest fields in American agriculture.

Under a system similar to the county agricultural agent program, floriculture agents will aid operators of large greenhouses in the big flower growing counties of New York.

Ernie, who hails from Dunkirk, N. Y., has not been wasting his time here at Cornell. In fact, it looks as if he'll need a whole page in the *Cornellian* for his achievements. Besides serving as Advertising Manager of the COUNTRYMAN, he is vice-president of both the Floriculture and Sears Scholarship Clubs and a member of Ho-Nun-de-Kah, 4-H, Grange, and Ag-Domecon.

He is a member of the Junior Potato and Vegetable Growers, which recently sent a team to Jackson, Mississippi. Last summer, Chautauqua Institution claimed his services.

The beckoning finger of Uncle Sam caught Ernie's eye after his sophomore year and he left for the wars in 1943. He spent three years in the army—first in the Army Specialized Training Program and then overseas in Europe. He came out with sergeant's stripes earned in the engineers, to resume his studies and many activities at Cornell. E.R.

Clauson '50

Frances Young

From animal husbandry to atomic bombs is quite a change—especially for one of the "weaker" sex. Yet, that's just what Fran Young did in 1945, in the spring of her sophomore year. Fran, on a year's leave of absence, went to Oak Ridge, Tenn. as a chemical analyst in the plants where the atomic bomb was being produced. There it was her job to analyze rubber gloves, shoes, and other articles of clothing worn by employees on the job, as well as floor sweepings and regular salvage samples for traces of uranium.

Fran was raised on a farm near Lockport, N.Y., where she developed a herd of sixteen registered Ayrshire cattle. Despite leanings toward chemistry and explosives, Fran has become a regular ag student here, majoring in an hus.

Before going to Tennessee, she held the Robert Adams Memorial Scholarship, was on the Browsing Library committee, an active member of the Young Co-operators, and on the Cornell team which won the national *Hoard's Dairyman* Judging Contest. A member of Sigma Kappa, Fran is now on the art staff of the COUNTRYMAN, chairman of publicity for the Round-up Club, and co-chairman of the social service committee in the Wesley church group.

An ardent believer in country life, Fran plans to put her accumulated knowledge of scientific agriculture and rural sociology into practical application soon after graduation. —J.W.

• • •

Clauson '50

Ivan Bigalow

"Red" or "Ivy" are two natural nicknames for this genial fellow student from Ticonderoga, N. Y. Some girls know him as "that good looking red head who assisted in Agricultural Engineering 10 last year." Some of the men know him as the fellow who assisted in Agricultural Engineering 40 a few years ago. Many know him either as President of the Forest Home Young People's Group, Social Chairman of Alpha Zeta, or as a member of Wesley Foundation, Round-Up Club, Ho-Nun-de-Kah, Grange, FFA, or as a member of some intramural football, baseball or basketball team. All who know him enjoy his unfailing good humor and dry wit.

Ivan started his college life in 1939 as a Chem Engineer. Since then he has transferred to the Ag College, taken two leaves of absence, spent some time in the army and made a host of friends at Cornell.

He will receive his B.S. in February, but as yet is undecided as to whether he should enter grad school, accept one of several jobs he has been offered—or get married. (He considers that a full time job.)

Whatever he does he will take with him a multitude of good wishes and no small amount of what it takes to succeed in his chosen field.

—G.S.C.

Cornell's agricultural economists say 1948 is a year for farmers to be cautious in their operations.

Coed in English Land Army

by Sylvia Colt '49

The Women's Land Army Hostel to which Phyllis Roberts and I have become attached, for a month, is in a small village called Mortimer. Naturally this name reminds some of us of Mortimer Snerd, and gives us just the correct hayseed feeling. The village boasts of five pubs and four stores, foremost of which is the fish and chips shop.

Our hostel, Strathfield house, is a great, square brick affair looming up from behind a holly hedge. It is characterized by its austerity of furniture and great cleanliness. All the inside walls are covered with a cream colored paper splashed with faded orange. The floors are wide wood planks. The ground floor contains the recreation room where a "wireless" sits in silent severity on a dark wood table and a number of nondescript arm chairs encircle a small fireplace. Blackout curtains still hang at the windows and no pictures relieve the flatness of the walls. The dining room contains four long tables seating six each, and its walls are covered only with notices about saving bread. Traveling down a dark corridor one reaches the most important room of all, the kitchen. It is one of the brightest rooms in the house and whenever unlocked is full of girls preparing little snacks from the stores that are set out.

The bedrooms are brighter than the downstairs because many bright bed spreads, donated by the Canadian Red Cross, cover the beds. On the whole there are six land girls in a room, each occupying a berth in one of the three double decker bunks.

One eats rather well at the hostel since there are only twenty four persons to cook for, and agricultural workers get extra rations. Food consists largely of bread and potatoes, very little milk and not too much meat or vegetables. One does not go hungry, and even eats better than at most other places, except perhaps on a private farm. Each girl has a little tin with her emblem, (X or initials, whichever the case may be) in which she is given her weekly sugar ration. This she can dole out to herself as she likes—use it all on her cornflakes one day or throughout the whole week. Unless this tin is kept in her room except when in use, the sugar is likely to disappear mysteriously. Once a month each girl gets a one pound jar of marmalade which she hoards carefully. My marmalade was downed in one night of folly, but my second issue lasted a full week and was finally finished by some visiting Frenchmen.

The hostel is managed by a warden, in this case a Mrs. Brown, who is helped by a number of women who work in the kitchen and do the tidying up in the rooms.

Rules about the correct time to be in the house are even more complicated here than at Cornell. Hours vary from 9:15 p.m. on Monday (presumably to enable us to recover from our wild weekends) to midnight on Saturday.

Of course the most interesting things about the hostel are the girls living there. One of them spoke of their feelings toward us: "The thing we most resent about you is your security. Most of us here are misfits, can't get on at home, have no home, so that we make this one." It is rather appalling, yet fascinating, to hear the life story of some of these girls, not only their life during the war but before it even began.

"Nodge" is a Londoner through and through, whose father was out of work for eight years and whose mother scrubbed floors and still scrubs them. Nodge was one of the many thousands evacuated to a wonderful home during the Battle of Britain. "Smashing great house,

(*Please turn to page* 13)

Sylvia Colt, '49 Ag, is our foreign correspondent. She has been in England since last June, doing her bit to pull John Bull out of his agricultural slump. Sylvia will return to Cornell this spring after having made an eight months' observation of food production conditions in the British Isles.

Cayuga's Little Fishes

by Gordon D. Rapp '49

Little did the founders of Cornell dream at the time of their selection of a site for this University, that their choice would enable the carrying on of important experiments in which our own Cayuga Lake would play a prominent part.

Cornell University is in a strategic location for the study of fresh water fishery problems, since Cayuga Lake, and its sister Finger Lakes provide a unique association of standing waters. The tributary streams, besides playing an important part in the life history of some of the lake fish, also offer an opportunity for field work on trout streams.

Method

Since 1941, the Laboratory of Limnology and Fisheries in the Department of Entomology, under the direction of Dr. Dwight A. Webster, has been engaged in a study of the smallmouth bass in Cayuga Lake. Thus far the field work has centered at Flat Rock, an important fall fishing area at this end of the lake, and Taughannock Creek, the site of a spawning run in the spring. Both these localities are on the west shore, about 1½ miles apart. An important phase of the work, accomplished by tagging the fish, lies in determining the amount of movement of bass populations between, as well as away from, these two areas.

Small serially numbered metal or celluloid tabs are attached to the jaw or back of the fish. In the case of small hatchery-reared fingerlings, on the other hand, a fin or part of the jaw is cut off to make identification possible.

31,600 Specimens

Most of the recovered bass thus treated—about 1,600 have been tagged and 30,000 have been marked to date—were recaptured in the general area from which they were released, although a few bass apparently developed a wanderlust and swam ten to 25 miles to the north before being caught. One unusual individual appeared to be running a taxi service between Flat Rock and Taughannock: originally tagged at the latter point in June, 1946, it was caught and released no less than four times, being too small to be legally kept, at Flat Rock in the fall of the same year. Then in August of 1947 it was caught for the sixth and last time back at Taughannock. Unfortunately it had attained the legal length of ten inches by this time and was not released again.

Other Factors Studied

Growth, another feature under study, is determined by the size of scales which are examined under the microscope. It has been found that it takes about 4 growing seasons for a Cayuga bass to reach legal size, and about 10 to 11 years for them to attain 3 or 4 pounds,—the kind that fishermen start bragging about. Different rates of growth exist in different portions of the lake, and variations also occur from season to season.

The marked fingerlings contribute information on movement as well as growth, but their real importance is to supply an estimate of the efficiency of artificial stocking, or just how many additional bass this stocking program provides for the frying pan.

Trout, Too

By far the greater part of Cayuga Lake is best suited for cold water-loving species like the trout, which is also getting its share of attention in the studies at Cornell. The work is being carried on along the same general pattern as that followed for bass, with over 36,000 lake trout and 17,000 rainbow trout having been marked and released in the lake so far. The rainbow trout is the faster growing and more spectacular of the two species. It runs up the tributaries to spawn in the early spring and it is there that it attracts most of the attention of fishermen.

Cooperation

Cornell University is cooperating with the New York State Conservation Department and the U. S. Fishing and Wildlife Service in

(*Please turn to page* 15)

Gordon D. Rapp '49, has branched out from his major interest, poultry, to write this article. Heretofore his main acquaintance with the genus *Pisces* has been in filets.

Trying their luck far below Cornell.

"Where Will I Stand, After This War?"

VICTORY—What then?

THIS MESSAGE from Harvester has special meaning for all agricultural college students. Post-war agriculture will look to you for leadership. Train yourselves now for that responsibility and opportunity. Apply your knowledge of better farm methods to post-war food production trends. As America's leading manufacturer of food production equipment, we urge you to complete your college work, if at all possible. Whether you do or not, there'll be no question where you will stand, after this war. *You'll stand ready with modern power farming equipment to do your part in shaping America's great farming future!*

"The big job is to win the war and get the boys home. But afterwards—will I be ready for Peace, when it comes? Will my family be on solid ground, or will I have got myself into deep water somehow?"

Questions like these face all of us as we are swept along by the wild forces of war. We are laying the ground work right now for what comes later. Let us plan wisely.

This year most farmers will work harder than ever before in their lives. The national farm income will soar to a record-high level. It is war income, and history shows that *war prosperity is temporary.* War profits must be handled with care!

In the farmer's pattern for Peace, these are sound rules to follow:

Buy War Bonds. Buy them for the duration, and to hold. They are our best investment in America's future and in our own personal future.

Pay Off Indebtedness. Be free of old obligations—ready for the needs of a post-war world.

Avoid Land Speculation. Beware of the gamble that may lead to grief, as it led so many farm families into years of trouble after the last war. Already there are signs that this hard chapter in farm history is repeating itself. Buy only land you can use and pay for.

Grade Up Your Livestock. Take this opportunity to cull out scrub and low-grade animals. Replace the culls with better stock, through breeding, and by use of better sires. Fewer and better animals are more profitable than many mongrels. Scrub cows and hogs demand about as much feed, shelter, and fencing as the best of stock, and take work and time that you can use more profitably. Improve your herds and flocks now and lay the foundation for prosperity in the years to come.

* *

In the 112-year history of INTERNATIONAL HARVESTER, five wars have interrupted the march of American farming. Each was followed by wonderful progress. When this global conflict ends, Harvester will face tremendous new problems.

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America's Leading Manufacturer of Food Production Equipment

F N 260 - á la Carte

by Anne Dickinson '49

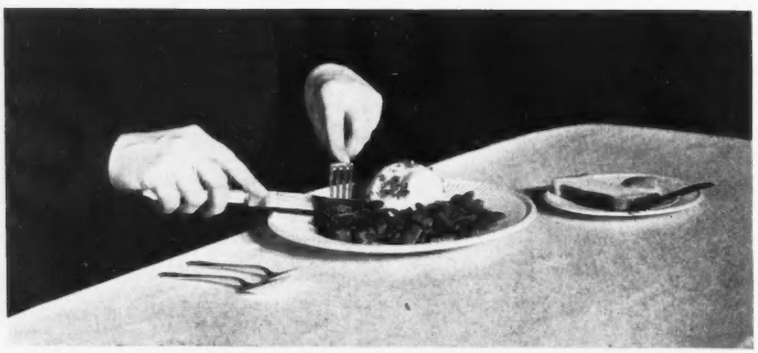
"My mother never went to the College of Home Economics and she's a wonderful cook. Seems to me you girls are just wasting four years learning to do something anyone could just naturally do." That is what an Ag student said to me the other day. So I really started to think about it. Was he right? Were we foods majors wasting our time "learning to cook?"

After much thought and serious deliberation, I reached the conclusion that cooking classes were not a waste of time. For example let's take F.N.260, popularly known as Meal Planning. And meal planning in a broad sense is exactly what it is. The girls taking this course plan and prepare several different types of meals emphasizing the organization and management of time, money and energy. For every meal prepared in laboratory, from simple breakfasts to formal dinners, each student must know the cost of every ingredient, the time required for each product and how this meal fits in nutritionally with the day's and the week's menus.

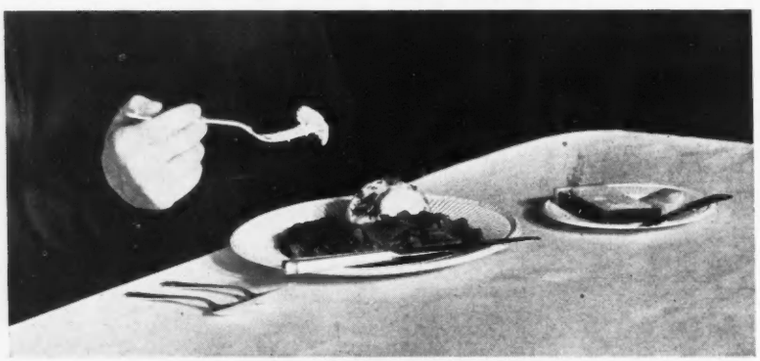
A knowledge of food costs and marketing is stressed by the instructor of the course, Mrs. Foster, an assistant professor in the College. She feels that one basis for good, well balanced meals is a thorough knowledge of all the aspects of food purchasing. Students learn to read labels, compare weights, cost, and quality before buying, thus developing their sense of value and discrimination.

During the course of the term the girls plan a week's menus for persons of different income levels. One of the projects this term was planning meals for an elderly couple on a budget of $3.00 a week per person. Impossible as it sounds, these girls did it—complete with variety, tastiness and nutritive value. In a plan of this sort, one also needs to know the exact amounts required in each recipe used. Thus, during the term each student compiles and knows quite a complete set of recipes which will be invaluable when the girls themselves are homemakers.

(*Please turn to page* 16)

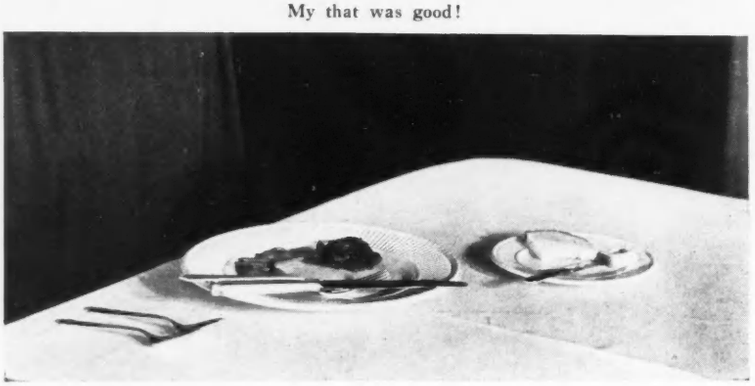


Will her home-cooked meal be good?



The first bite.

My that was good!



So was the dessert!

Coed In Land Army

(Continued from page 9)

super parks, they gave us nearly everything we wanted." She was however, so used to the noise of London, to eating fish and chips instead of anything substantial, that she did nothing but plague her foster parents until she was sent home. She's now nineteen, has been in the Land Army for one year, and at work since she was thirteen.

Another person at the hostel is Mary, a great hulk of a girl, whose father is dead and whose mother is a warden in Hollawat prison for women. Mary had a smashing time during the war, "It was awful, but I had the best time of me life." She described the first Buzz Bomb she ever saw and how she reacted so bitterly against the Germans, "Spit in their eye I would have." At present she's engaged to a German P.O.W. and is just as crazy over "Me old Fritz" as is any Delta Gamma girl over a Chi Phi.

Ella is a relief milker; that is she goes to a station of farms and relieves the cowman from his chores. A very lovely girl, she hates the hostel and works too hard. She also spent most of the blitz in London, biking to work each day until her bike was blown from beneath her and all she could find was the bell.

These then are the girls, the ones described are the best of the lot. Most of the others are those who give the land army its bad name. The surprising thing about them is their likeness to a group of college girls. Though most of them never went to school beyond the age of 14, they talk about the same things, seem interested in the same things as is any typical corridor of girls. Perhaps this is an indictment against college education for women, in that it fails to broaden their outlook. Perhaps it just proves that girls are alike the world around.

These girls mostly do gang work, going out in the vans each morning, returning at 5:30 or 6. They must work a minimum of 48 hours a week and are required to do overtime during the peak seasons when so requested. They average about 2 pounds (8 dollars) per week over and above their board, which comes to 1 pound 5 shillings, or 5 dollars.

For recreation the girls entertain troops from a nearby camp. Some of the boys take the girls to one of the pubs for a game of darts, a chandy and a chat. Others queue up outside the fish and chip shop, while the rest relax in the recreation room, listen to dance music, and "shoot the breeze." At closing hour the door of the hostel much resembles Risley's main entrance in that it tempts one to throw water bombs.

It's a good place, this hostel, especially for a short stay. A long stay would soon cause one to become nothing but an eating, sleeping, chatting automaton, for one has little chance for reading or studying here. It's a friendly place where one is soon taken into the fold and called "Love" and "Duck," and treated with directness and sincerity. It's a place which brings out the best and the worst, for here one is subjected to the many petty trials which arise from living and working closely together; yet one is also required to arise to the need for workers to sow, tend and reap the harvest, which Britain so urgently needs in her hour of crisis.

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Former Student Notes

1947

Mary Driscoll is a social worker with the Travelers Aid Society in New York City.

Myrene Gray is teaching on the Navajo Indian Reservation at Toadlena, New Mexico.

Lewis Lichtman is taking a management training program with the Kroger Company, Detroit.

Gustav Papanek, a graduate student at Harvard, is studying agricultural economics.

Lois Rabenstein is doing statistical work for the Department of Agriculture and Markets in Albany.

Niels Robinson works at the Hillview Ranch, Oaksdale, Washington as a herdsman of purebred Herefords.

1943

Ben Miles is a field operator with the Comstock Canning Corporation, Newark, N.Y.

Walter Stern has managed the Borden Home Farm at Wallkill, New York, for four years.

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Ag-tivities

(*Continued from page 7*)

Home Ec Club

Plans are being made for the sale of lost and found articles collected during the past few years in Martha Van Rensselaer. The money raised in this project will assist a home economics college in Germany which the club will adopt.

The first issue of the home economics monthly newspaper will be published the first of next term. Virginia Taylor is editor of the publication which will carry college, social, educational, departmental, faculty news, student's features, and a list of vocational speakers coming to the campus.

Sears

Sears Scholarship Club will hold a meeting on January 18, which all members are requested to attend. A dance is planned for early in February in conjunction with the Ag-Domecon Council.

AGR

AGR added another honor to its already long list when Dick Darley—a pledge this fall—won the hard fought battle for presidency of the Class of '51.

Plans for renewing their annual fall formal house party, have already taken root. The Cornell and imported coeds, will be dancing to the strains of Dick Flight's orchestra on January 22nd.

AZ

Speaking of house parties, Alpha Zeta will reinstate its formal this fall on January 24th. Dick Flight and his orchestra will be on hand to provide the dance tunes.

Cayuga's Fishes

(*Continued from page 10*)

carrying out these and other fishery investigations. Local fishermen have also shown considerable interest in the program and form an important link in contributing information essential to the studies.

Dr. Webster hopes that this long-term investigation will yield more information on the present stocking program, and that the results obtained may ultimately be used to reduce the average time to catch a legal bass at Flat Rock, about four hours, to a less discouraging time interval.

ORNITHOLOGY
Laboratory Notebook

THE FIFTH EDITION of the *Ornithology Laboratory Notebook* has been simplified to the extent of omitting all but the essentials of an elementary college course, so as not to confuse the beginner with extraneous details not essential to his early progress in ornithology. The keys have been enlarged to include all the Orders and Families of North American birds, and the outline drawings have been augmented with drawings of species from all parts of North America. The migration data on birds has also been brought up-to-date in accordance with recent findings.

A feature of this notebook has always been the 187 outline drawings of birds, mostly by Louis Agassiz Fuertes, with maps to indicate distribution, and data to be filled in by the student.

Arthur A. Allen, the author of the *Notebook,* is Professor of Ornithology in Cornell University, and is the author of several books on birds including *American Bird Biographies, The Golden Plover and Other Birds,* and *The Book of Bird Life.*

Contents. *Topography of the Bird—Feather Tracts of the Bird—Parts of the Feather—Skeleton of the Bird—Keys to the Orders of North American Birds—Keys to the Families of Birds Found in North America—Keys to the Nests of the Commoner Summer-Resident Birds of Northeastern North America—Summer and Winter Ranges of North American Birds—Life History and Identification Charts—Plate of Egg Shapes—Check Lists of Birds of Eastern North America.*

8½ x 11 inches * 265 pages * $4.00

Comstock Publishing Co., Inc.

ITHACA, N. Y.

FN 260

(*Continued from page* 12)

Time, in meal planning, as in everything else, is of great importance. Much as we may like to cook, no one, not even a foods major, wants to spend her entire life in the kitchen. The aim of thoughtful planning is to have delicious, attractive meals, using as little time and energy as possible, and wasting none. This is done in laboratory by making a time schedule and correlating the various products to be prepared so that each is ready at the proper time. The time schedule, of course, is dependent upon the menu, so when making menus, the girls are taught to consider carefully time requirements. So again, a knowledge of recipes is most helpful.

Table service and etiquette are not neglected in F.N. 260. The students have the chance to select various china, linen and silver combinations for their meals and learn which best suits their tastes and menus.

The atmosphere in which a meal is eaten may make an otherwise delicious meal drab and ordinary. Therefore, every girl taking the course must develop the art of carrying on a pleasant conversation at the dinner table. (Food as a topic is taboo.)

The man who marries an F.N. 260 student will not only be assured of having delicious, wholesome meals—kind to his pocket book and served on time, but he will have a good conversationalist across the table from him and a companion who won't have to spend all of her time in the kitchen.

Do I think "cooking" classes are a waste of time? Of course not!

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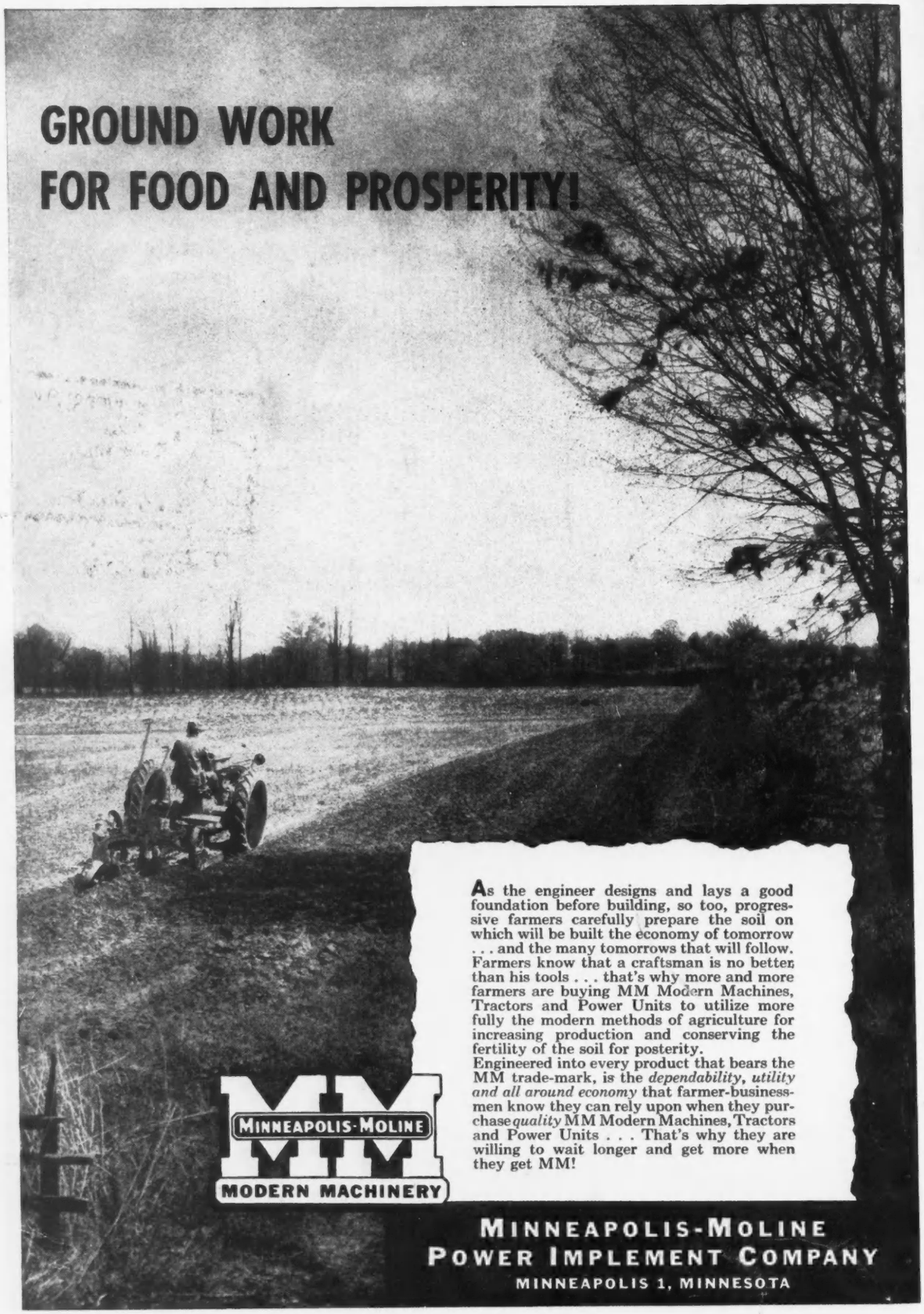
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